

Item	Symptom	Effect	Failure mode (why?)	Probability of failure	Severity of effect	Risk priority	Remedial action
Mechanical							
Legs	Bend/Break	Device Failure	Excessive weight supported	1	4	4	Repair
		Loss of Stability					
Door	Bend/break	Device Failure	Excessive pressure on door	1	4	4	Replace
Door Nuts	Threads Strip	Door Security Failure	Excessive pressure on door nuts	1	2	2	Replace
Door Gasket	Tearing, failing, leaking	Door Seal Failure	Excessive weight on door gasket	1	2	2	Replace
Racks	Dislodging, moving	Misdistribution of beads	Excessive weight on racks	1	2	2	Repair with stronger welds
Pump	Failing	Stagnant solution	Overheating	1	2	2	Replace
		Solution Overheating	Bad pump				
Chemical							
Beads	Crushed	Loss of Beads	Mishandling	4	1	4	Careful handling
	Overheating	Dead Yeast	Pump/ cooling failure	2	4	8	Make more beads
Solution	Contamination	Contaminants in solution	Sanitation	2	1	2	Proper sanitation
Tulle bag	Tearing / leaking	Beads falling out	Catching / loosening	3	1	3	Make new bag

		Very Probable	Probable	Occasional	Remote	Improbable
		5	4	3	2	1
Catastrophic	4	20	16	12	8	4
Critical	3	15	12	9	6	3
Marginal	2	10	8	6	4	2
Negligible	1	5	4	3	2	1

Severity of Effect

Catastrophic	The failure causes substantial damage to the product itself or related items (including people), requiring repair.
Critical	The failure causes significant damage to the product itself or related items, requiring repair.
Marginal	The failure causes some damage to the product itself or related items, potentially requiring repair.
Negligible	The failure causes no significant damage.

Probability of Failure

Very Probable	Every time
Probable	Most times
Occasional	Observed multiple times during the project.
Remote	Might be possible during the project.
Improbable	Maybe observed once during the project or predicted to happen after hand off.